

Recombinant TMEM173 (STING) (149-379) protein

Catalog No: 81182, 81882

Expressed In: *E. coli*

Quantity: 50, 1000 µg

Concentration: 0.3 µg/µl

Source: Human

Buffer Contents: Recombinant TMEM173 (STING) (149-379) protein is supplied in 25 mM Tris pH 8.0, 300 mM NaCl, 10% glycerol.

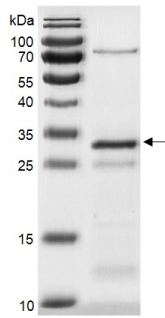
Background: STING (Stimulator Of Interferon Genes, also known as TMEM173, HMITA, NET23, ERIS, MPYS, MITA, SAVI) is a five transmembrane protein that functions as a major regulator of the innate immune response to viral and bacterial infections. STING is a pattern recognition receptor that detects cytosolic nucleic acids and transmits signals that activate type I interferon responses. It has also been shown to play a role in apoptotic signaling by associating with type II major histocompatibility complex. It acts by recognizing and binding cyclic di-GMP (c-di-GMP), a second messenger produced by bacteria, and cyclic GMP-AMP (cGAMP), a messenger produced in response to DNA virus in the cytosol: upon binding of c-di-GMP or cGAMP, autoinhibition is alleviated and TMEM173/STING is able to activate both NF-kappa-B and IRF3 transcription pathways to induce expression of type I interferon and exert a potent anti-viral state.

Protein Details: Recombinant TMEM173 (STING) (149-379) corresponding to amino acids 149-379 of human STING (accession number NP_938023.1) was expressed in *E. coli* cells and contains a C-terminal 6×His tag with a molecular weight of 27.3 kDa.

Application Notes: This product was manufactured as described in Protein Details. Where possible, Active Motif has developed functional or activity assays for recombinant proteins. All available data for a given product is shown on the lot-specific Technical Data Sheet.

Storage and Guarantee: Recombinant proteins in solution are temperature sensitive and must be stored at -80°C to prevent degradation. Avoid repeated freeze/thaw cycles and keep on ice when not in storage. This product is for research use only and is not for use in diagnostic procedures. This product is guaranteed for 6 months from date of arrival.

STING (149-379)



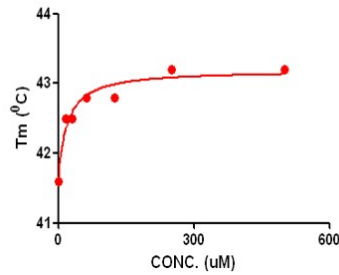
Recombinant TMEM173 (STING) (149-379) gel

12.5% SDS-PAGE Coomassie staining

M.W.: 27.3 kDa

Purity: ≥ 65%

2',3'-cGAMP Kd test for hSTING



cGAMP Kd test for Recombinant TMEM173 (STING) (149-379)

Serial dilutions of cGAMP was incubated with Recombinant TMEM173 in reaction buffer including 20 mM Tris-HCl pH 7.5 and 150 mM NaCl at room temperature. Dye solution was added and the reaction was read on ViiA7qPCR system (ex/em=470/558, 25°C to 95°C).